IN THE CLAIMS:

1. (Currently Amended) An active energy ray-curable organopolysiloxane resin composition comprising:

(A) 100 parts by weight of an epoxy-containing organopolysiloxane resin represented by the following siloxane unit formula (1):

$$(R^{1}R^{2}R^{3}SiO_{1/2})_{a}(R^{4}R^{5}SiO_{2/2})_{b}(R^{6}SiO_{3/2})_{c}(SiO_{4/2})_{d}$$
 (1)

where R^1 , R^2 , R^3 , R^4 , R^5 , and R^6 are organic groups selected from univalent aliphatic hydrocarbon groups with 1 to 6 carbon atoms, univalent aromatic hydrocarbon groups with 6 to 10 carbon atoms, and epoxy-containing univalent hydrocarbon groups, wherein in one molecule the siloxane units with epoxy-containing univalent hydrocarbon groups constitute 2 to 50 mole%, the univalent aromatic hydrocarbon groups with 6 to 10 carbon atoms constitute more than 15 mole% of all organic groups, and where the following conditions are satisfied: a+b+c+d=1; "a" on average satisfies the following condition; $0 \le a < 0.4$; "b" on average satisfies the following condition; 0 < b < 0.5; "c" on average satisfies the following condition; $0 \le d < 0.4$; [[and]] "b" and "c" are bound by the following condition; $0.01 \le b/c \le 0.3$; and wherein the total content of alkoxy groups and hydroxyl groups on silicon atoms of the epoxy-containing organopolysiloxane resin is no more than 2 mole % of all substituents on silicon atoms;

- (B) 0.05 to 20 parts by weight of a photopolymerization initiator; and
- (C) 0 to 5000 parts by weight of an organic solvent.

Attorney Docket No.: 071051.00034

Application No.: 10/582,154

2. (Original) The active energy ray-curable organopolysiloxane resin composition

according to Claim 1 for use as a cured body in the form of a film.

3. (Original) The active energy ray-curable organopolysiloxane resin composition

according to Claim 1 for use as a light-transmitting component.

4. (Currently Amended) The active energy ray-curable organopolysiloxane resin

composition according to Claim 3, wherein said light-transmitting component is an

optical waveguide.

5. (Previously Presented) The active energy ray-curable organopolysiloxane resin

composition according to Claim 1, wherein said active-energy rays are ultraviolet rays.

Attorney Docket No.: 071051.00034

Application No.: 10/582,154

- 5 -

6. (Currently Amended) A light-transmitting component obtained by curing (A) an epoxy-containing organopolysiloxane resin represented by the following siloxane unit formula (1):

$$(R^{1}R^{2}R^{3}SiO_{1/2})_{a} (R^{4}R^{5}SiO_{2/2})_{b} (R^{6}SiO_{3/2})_{c} (SiO_{4/2})_{d}$$
 (1)

where R¹, R², R³, R⁴, R⁵, and R⁶ are organic groups selected from univalent aliphatic hydrocarbon groups with 1 to 6 carbon atoms, univalent aromatic hydrocarbon groups with 6 to 10 carbon atoms, and epoxy-containing univalent hydrocarbon groups, wherein in one molecule the siloxane units with epoxy-containing univalent hydrocarbon groups constitute 2 to 50 mole%, the univalent aromatic hydrocarbon groups with 6 to 10 carbon atoms constitute more than 15 mole% of all organic groups, and where the following conditions are satisfied: a+b+c+d=1; "a" on average satisfies the following condition; $0 \le a < 0.4$; "b" on average satisfies the following condition; 0 < b < 0.5; "c" on average satisfies the following condition; 0<c<1; "d" on average satisfies the following condition; $0 \le d < 0.4$; [[and]] "b" and "c" are bound by the following condition; $0.01 \le b/c \le 0.3$; and wherein the total content of alkoxy groups and hydroxyl groups on silicon atoms of the epoxy-containing organopolysiloxane resin is no more than 2 mole \% of all substituents on silicon atoms under effect of irradiation with active energy rays in the presence of (B) a photopolymerization initiator where component (B) is used in an amount of 0.05 to 20 parts by weight for each 100 parts by weight of component (A).

Attorney Docket No.: 071051.00034

Application No.: 10/582,154

7. (Original) The light-transmitting component according to Claim 6, wherein said light-

transmitting component is an optical waveguide.

8. (Original) The light-transmitting component according to Claim 6, wherein said

optical waveguide is made in the form of a film.

9. (Original) The light-transmitting component according to Claim 6, wherein said

active-energy rays are ultraviolet rays.

10. (Original) A method of manufacturing a light-transmitting component, comprising

the steps of: applying the active energy ray-curable organopolysiloxane resin composition

of Claim 1 onto a substrate; and curing the applied composition by irradiating it with

active-energy rays.

11. (Previously Presented) A method of manufacturing an optical waveguide,

comprising the steps of: 1) forming a lower cladding layer by applying the active energy

ray-curable organopolysiloxane resin composition of Claim 1 onto a substrate and by

curing the applied material by irradiating it with active-energy rays; 2) forming a core

layer by applying the active energy ray-curable organopolysiloxane resin composition of

Claim 1 onto the lower cladding layer and by curing the applied layer by irradiating it

with active energy rays; optionally, processing the core layer into a desired shape; and 3)

forming an upper cladding layer by applying the active energy ray-curable

- 7 -

organopolysiloxane resin composition of Claim 1 onto the core layer, and curing the applied material by irradiating it with active-energy rays.

Please add the following new claims.

- 12. (New) The method of manufacturing an optical waveguide according to Claim 11, wherein the refractive index of the cured body is greater than the refractive index of
- the cladding layer.
- 13. (New) The active energy ray-curable organopolysiloxane resin composition according to Claim 1, wherein the epoxy-containing organopolysiloxane resin represented by the siloxane unit formula (1) is selected from the group of organopolysiloxane resins composed of (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₃SiO_{1/2}), (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Ph₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E²SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E³SiO_{3/2}) uni

Attorney Docket No.: 071051.00034

(E³SiO_{3/2}), and (SiO₂) units; (Me₂SiO_{2/2}), (Ph₂SiO_{2/2}), (E¹SiO_{3/2}), and (SiO₂) units; (Me₃SiO_{1/2}), (Me₂SiO_{2/2}), (PhSiO_{3/2}), (E¹SiO_{3/2}), and (SiO₂) units; and (Me₃SiO_{1/2}), (Me₂SiO_{2/2}), (PhSiO_{3/2}), (E³SiO_{3/2}), and (SiO₂) units; wherein Me designates a methyl group, Vi designates a vinyl group, Ph designates a phenyl group, E¹ designates a 3-(glycidoxy)propyl group, E² designates a 2-(glycidoxycarbonyl)propyl group, E³ designates a 2-(3,4-epoxycyclohexyl)ethyl group, and E⁴ designates 2-(4-methyl-3,4-epoxycyclohexyl) propyl group.

14. (New) The light-transmitting component according to Claim 6, wherein the epoxy-containing organopolysiloxane resin represented by the siloxane unit formula (1) is selected from the group of organopolysiloxane resins composed of (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₃SiO_{1/2}), (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E¹SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E²SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E³SiO_{3/2}) units; (Me₂SiO_{2/2}), (PhSiO_{3/2}), and (E³SiO_{3/2}), (PhSiO_{3/2}), and (E³SiO_{3/2}), (PhSiO_{3/2}), (PhSiO_{3/2}

Attorney Docket No.: 071051.00034

 $(E^1SiO_{3/2})$, and (SiO_2) units; $(Me_3SiO_{1/2})$, $(Me_2SiO_{2/2})$, $(PhSiO_{3/2})$, $(E^1SiO_{3/2})$, and (SiO_2) units; and $(Me_3SiO_{1/2})$, $(Me_2SiO_{2/2})$, $(PhSiO_{3/2})$, $(E^3SiO_{3/2})$, and (SiO_2) units; wherein Me designates a methyl group, Vi designates a vinyl group, Ph designates a phenyl group, E^1 designates a 3-(glycidoxy)propyl group, E^2 designates a 2-(glycidoxycarbonyl)propyl group, E^3 designates a 2-(3,4-epoxycyclohexyl)ethyl group, and E^4 designates 2-(4-methyl-3,4-epoxycyclohexyl) propyl group.

Attorney Docket No.: 071051.00034

Application No.: 10/582,154